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# Application No. Applicant(s) 10/666,825 BERGER ET AL. Notice of Allowability Examiner Art Unit Naheed Ejaz 2611 -- The MAILING DATE of this communication appears on the cover sheet with the correspondence address--All claims being allowable, PROSECUTION ON THE MERITS IS (OR REMAINS) CLOSED in this application. If not included herewith (or previously mailed), a Notice of Allowance (PTOL-85) or other appropriate communication will be mailed in due course. THIS NOTICE OF ALLOWABILITY IS NOT A GRANT OF PATENT RIGHTS. This application is subject to withdrawal from issue at the initiative of the Office or upon petition by the applicant. See 37 CFR 1.313 and MPEP 1308. 1. This communication is responsive to October 2, 2007. 2. The allowed claim(s) is/are 1, 4 & 5 renumbered as 1-3. 3. Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f). a) 🔲 All b) Some\* c) None of the: 1. Certified copies of the priority documents have been received. 2. Certified copies of the priority documents have been received in Application No. 3. Copies of the certified copies of the priority documents have been received in this national stage application from the International Bureau (PCT Rule 17.2(a)). \* Certified copies not received: \_\_\_ Applicant has THREE MONTHS FROM THE "MAILING DATE" of this communication to file a reply complying with the requirements noted below. Failure to timely comply will result in ABANDONMENT of this application. THIS THREE-MONTH PERIOD IS NOT EXTENDABLE. 4. A SUBSTITUTE OATH OR DECLARATION must be submitted. Note the attached EXAMINER'S AMENDMENT or NOTICE OF INFORMAL PATENT APPLICATION (PTO-152) which gives reason(s) why the oath or declaration is deficient. 5. CORRECTED DRAWINGS (as "replacement sheets") must be submitted. (a) including changes required by the Notice of Draftsperson's Patent Drawing Review (PTO-948) attached 1) hereto or 2) to Paper No./Mail Date \_ (b) including changes required by the attached Examiner's Amendment / Comment or in the Office action of Paper No./Mail Date Identifying indicia such as the application number (see 37 CFR 1.84(c)) should be written on the drawings in the front (not the back) of each sheet. Replacement sheet(s) should be labeled as such in the header according to 37 CFR 1.121(d). 6. DEPOSIT OF and/or INFORMATION about the deposit of BIOLOGICAL MATERIAL must be submitted. Note the attached Examiner's comment regarding REQUIREMENT FOR THE DEPOSIT OF BIOLOGICAL MATERIAL. Attachment(s) 1. Notice of References Cited (PTO-892) 5. Notice of Informal Patent Application 2. Notice of Draftperson's Patent Drawing Review (PTO-948) 6. Interview Summary (PTO-413). Paper No./Mail Date 3. Information Disclosure Statements (PTO/SB/08), 7. Examiner's Amendment/Comment Paper No./Mail Date 4. Examiner's Comment Regarding Requirement for Deposit 8. X Examiner's Statement of Reasons for Allowance of Biological Material 9. Other \_\_\_\_\_.

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#### **DETAILED ACTION**

## Reasons for Allowance

- 1. Claims 1, 4 & 5 are allowed.
- 2. The following is an examiner's statement of reasons for allowance:
- 3. With respect to claims 1, 4 & 5: the prior art of records fail to teach or suggest a method for communicating binary data, having logical "0" and "1" value types, as a sequence of UWB pulses each including a carrier signal, the method comprising: sensing whether a carrier phase of a received UWB pulse is inverted or not; rectifying and filtering the received UWB pulse to provide a unidirectional signal; adjusting the polarity of the unidirectional signal based on whether the sensed carrier phase is inverted or not; and detecting the binary data of the adjusted unidirectional signal using a zero-amplitude sensing threshold, thereby increasing immunity to noise as recited in an independent claim 1 and in combination with other elements of the claim.
- 4. Any comments considered necessary by applicant must be submitted no later than the payment of the issue fee and, to avoid processing delays, should preferably accompany the issue fee. Such submissions should be clearly labeled "Comments on Statement of Reasons for Allowance."

#### Conclusion

- 5. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.
  - Nielsen (2004/0179631) teaches UWB receiver architecture.

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- McCorkle et al. (7,010,056) teach system and method for generating ultra wideband pulses.

## Contact Information

6. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Naheed Ejaz whose telephone number is 571-272-5947. The examiner can normally be reached on Monday - Friday 8:00 - 4:30.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Chieh Fan can be reached on 571-272-3042. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

Naheed Ejaz Examiner Art Unit 2611

10/9/2007

CHIEH M. FAN
SUPERVISORY PATENT EXAMINER